



RESIDENTIAL DECKS

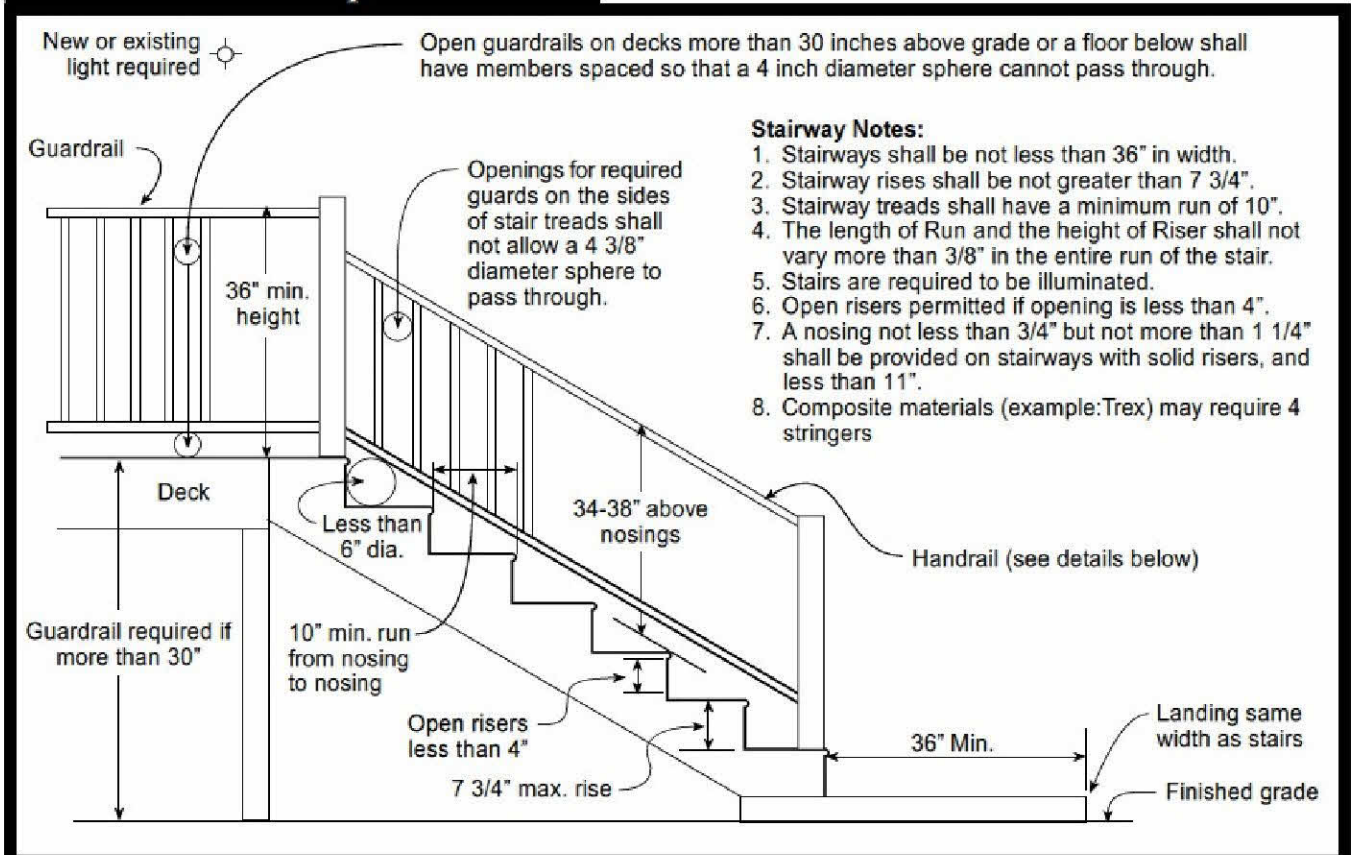
When to Call for Inspections

1. Footing/ Post Holes – Holes dug, clean and free from debris. Prior to concrete placement
2. Framing – If deck is close to the ground and framing verification will be difficult
3. Framing/ Final – Deck, stairs, guards, handrails, and landing all complete.
4. Other Inspections – Separate electrical, plumbing, and mechanical inspections are required if those systems are included in your project. Electrical inspections are performed by the State Electrical Inspector unless no new circuits are being added to the breaker box.

You must notify your inspector when the job is ready for inspection.

The location of the deck on the lot will be subject to all zoning requirements.

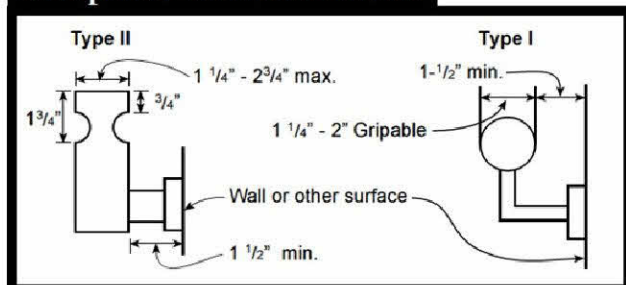
Stair & Handrail Specifications



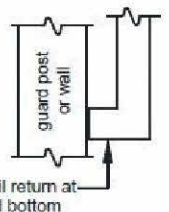
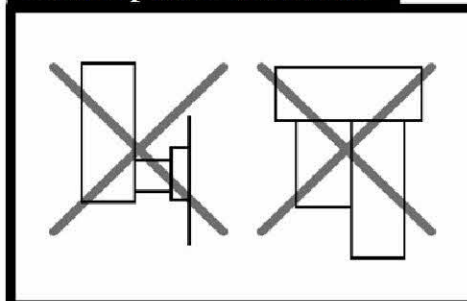
Handrail Notes:

1. Handrails shall be continuous on at least one side of stairs with 4 or more risers.
2. Top of the handrails shall be placed not less than 34 inches nor more than 38 inches above stair nosings.
3. The handgrip portion of handrails shall be not less than 1-1/4 inches nor more than 2 1/4 inches in cross section for non circular handrails.
4. Handrails shall be placed not less than 1-1/2 inches from any wall or other surface.
5. Handrails to be returned to wall, post or safety terminal (per 311.5.6.2 IRC)

Acceptable Handrail Details

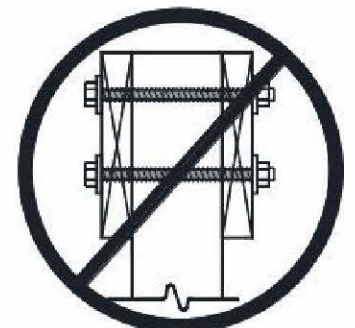
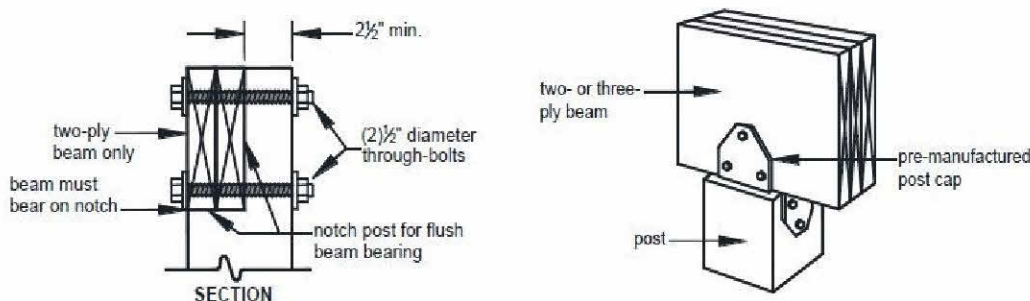


Unacceptable Handrails

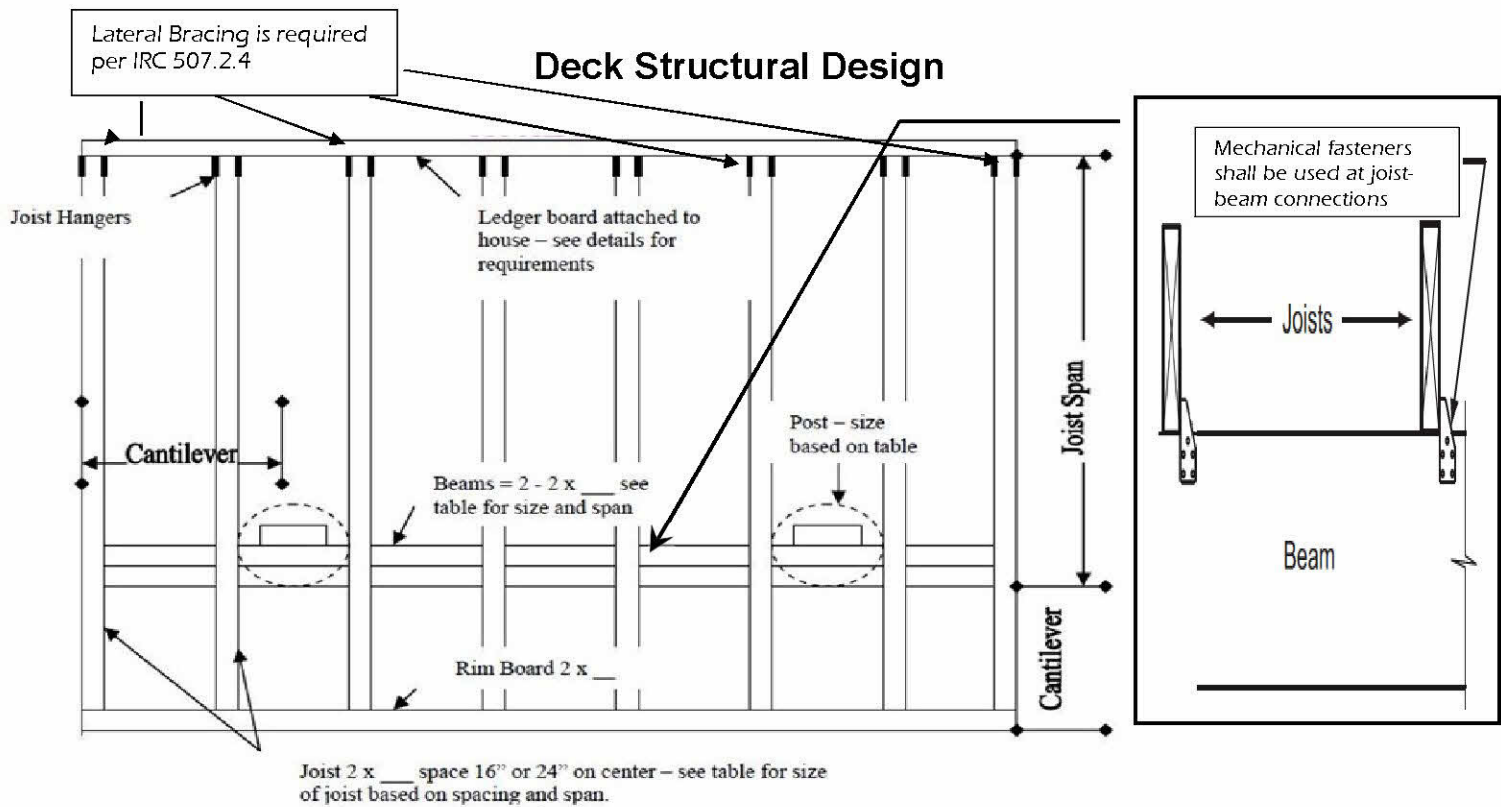


Handrail Return Example

Post/ Beam Connection



Deck Structural Design



Joist Spans			
Joist Size and Spacing	Spacing (inches)	No Cantilever	Cantilever
		Span (feet-inches)	Span (feet-inches)
2 x 6	12" o.c.	9-11	6-8
	16" o.c.	9-0	6-8
	24" o.c.	7-7	6-8
2 x 8	12" o.c.	13-1	10-1
	16" o.c.	11-10	10-1
	24" o.c.	9-8	9-8
2 x 10	12" o.c.	16-2	14-6
	16" o.c.	14-0	14-0
	24" o.c.	11-5	11-5
2 x 12	12" o.c.	18-0	18-0
	16" o.c.	16-6	16-6
	24" o.c.	13-6	13-6

Notes:

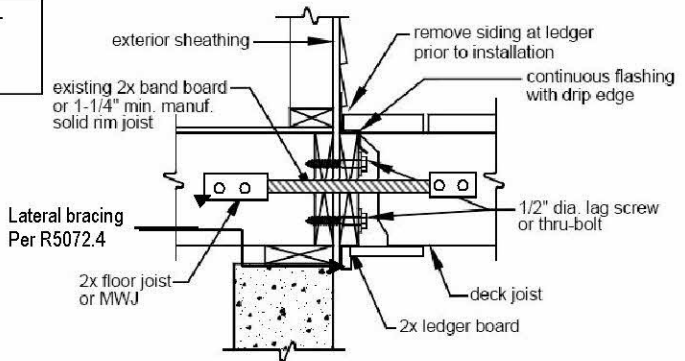
- Joists may cantilever the length of the joist depth without a span reduction.
- Joists may cantilever 1/4 of the actual joist span.

Beam Sizing Table							
Beam Size	Joist Spans (feet)						
	6	8	10	12	14	16	18
Beam Spans (Feet-Inches)							
(2) 2x6	6-11	5-11	5-4	4-10	4-6	4-3	4-0
(2) 2x8	8-9	7-7	6-9	6-2	5-9	5-4	5-0
(2) 2x10	10-4	9-0	8-0	7-4	6-9	6-4	6-0
(2) 2x12	12-2	10-7	9-5	8-7	8-0	7-6	7-0
(3) 2x6	8-2	7-5	6-8	6-1	5-8	5-3	5-0
(3) 2x8	10-10	9-6	8-6	7-9	7-2	6-8	6-4
(3) 2x10	13-0	11-3	10-0	9-2	8-6	7-11	7-6
(3) 2x12	15-3	13-3	11-10	10-9	10-0	9-4	8-10
Beams may cantilever 1/4 of the actual beam span							

Decking Materials Spans		
Material	Max Joist Spacing	
	Perpendicular	Diagonal
5/4 Decking	16"	12"
Nominal 2" Decking	24"	16"
Composite Decking	Follow Manufacturers Specs	

Deck Post Height	
Deck Post Size	Maximum Height (feet)
4x4	8'
4x6	8'
6x6	14'

Deck Ledger Detail



Sizing Deck Footings

Frost Depth is 42 inches

*If attaching deck to dwelling, frost footings & ledger board required

*Area "?" =

4-10	Square feet or less	use	8"	Pier
11-20	Square feet or less	use	10"	Pier
21-30	Square feet or less	use	12"	Pier
31-40	Square feet or less	use	14"	Pier
41-50	Square feet or less	use	16"	Pier
51-60	Square feet or less	use	18"	Pier

